

The African-American Financial Services Market: Profiling The Substantiality And Viability Of An Underserved Segment

Thomas H. Stevenson, (E-mail: thstevenson@email.uncc.edu), University of North Carolina, Charlotte

D. Anthony Plath, (E-mail: daplath@email.uncc.edu), University of North Carolina, Charlotte

Abstract

The purpose of this study is to help marketers recognize, understand and respond to the underserved African-American financial services market in the U.S. To do so, the study examines demographic trends and financial consumption patterns of African-American consumers, drawing on the most recent Survey of Consumer Finances to explore the principal differences between black and white households' asset holdings and financial product and service preferences. Findings indicate that the African-American market has grown rapidly in size and viability over the past decade, and that African-American consumers differ markedly from their white counterparts in terms of financial product preferences and investment portfolio composition. The difference between the two segments is especially evident in the case of relatively more risky, but higher return, financial products. Based on these findings it is apparent that marketers should endeavor to reach this increasingly attractive but underserved segment of the U.S. financial services marketplace.

1. Introduction

The importance of segmentation in the identification of viable target markets is well established in the literature. There are many bases used for market segmentation, but demographic factors such as age, occupation, income level, educational attainment, and race are frequently used to identify key markets. Race has become increasingly important as a segmentation variable because it has been shown that race can influence consumption patterns and because racial minorities have come to represent a larger and larger proportion of the U.S. population. The sheer numbers of the largest minority group, African-Americans, and the improving economic status of many of its members, make this racial minority especially attractive.

Nevertheless, relatively few studies in the marketing and finance literature have profiled differences in financial asset portfolio holdings of black versus white households, or examined whether these differences indicate that financial service providers should tailor their marketing efforts differently to the two groups. (The terms "African-American" and "black" are used synonymously in this paper because there is no clear preference for either term among members of this racial group [Morris, 1993]). The purpose of this study is threefold: The first is to determine whether or not the African-American market for financial services is substantial enough to merit the attention of financial services marketers. The second is to determine if there are racial differences in investment asset ownership patterns between black and white households sufficient to justify a unique marketing approach for the African-American segment. The third is to evaluate whether the information developed here is consistent with information reported in other academic work that examines racial differences in wealth accumulation patterns and risk tolerance levels.

2. The African-American Consumer

The number of African-Americans in the U.S. has grown rapidly. In the ten-year period from 1990 to 2000 for example, there was an increase of more than 4.8 million blacks in the U.S., a nearly 16 percent increase. The corresponding percentage increase for whites in the same period was just over eight percent. During the 1990 to 1998 period, the number of black households grew by 18 percent; white households grew by only eight percent. Moreover, the total U.S. population of blacks is predicted to increase by nearly 12 million by the year 2025. This represents a projected 33 percent increase over the 25 years from 2000; the white population is forecast to grow only 17 percent during the corresponding period (U. S. Department of Commerce, 2000).

Nevertheless, a mere increase in numbers of people does not mean that a particular group is an attractive segment. Other factors must be present. In the case of the black minority, at the same time that it is increasing in numbers, its household income is also increasing. From 1990 to 1998, median money income of black households increased nearly 36 percent while white household median money income increased less than 28 percent. The increase in black household income is reflected in declining poverty levels in the group. From 1990 to 1998 there was a nearly eight percent drop in the number of black persons below the poverty level; the comparable drop in the percentage of whites below the poverty level was five percent. Nevertheless, even though the percentage of blacks dropped to about 26 percent (lower than it had been for more than 30 years), the large number of African-Americans below the poverty level means that not all members of the group have participated equally in the upward economic movement (U. S. Department of Commerce, 2000).

Yet for those who have improved economically, some of the improvement can be explained by changes in occupational status. For example, the number of blacks employed in managerial and professional specialties increased by more than 145 percent, an increase of more than 1,916,000 workers, from 1983 to 1999. During this period increases in some specific occupations were as follows: financial managers, 320 percent; lawyers, 196 percent; physicians, 147 percent; college and university teachers, 138 percent; engineers, 125 percent; and pharmacists, 101 percent. These career advancements were supported by increases in the college enrollment of many African-Americans. For example, in the period from 1990 to 1998, black college enrollment increased by 45 percent, an increase of more than 600,000 individuals. These increases in African-American enrollment generated a significant increase in degrees awarded. From 1990 to 1997 the increase in degrees awarded to African-Americans was as follows: bachelors' degrees, 54 percent; masters' degrees, 83 percent; doctors' degrees, 60 percent; and first professional degrees, 54 percent (U. S. Department of Commerce, 2000).

Beyond attainments in income, professional employment, and education, many blacks have also advanced entrepreneurially. From 1987 to 1992 there was a 46 percent increase in black-owned businesses. This growth of nearly 200,000 businesses, in the five-year period, helped to generate an increase of 63 percent in sales receipts to black-owned businesses. Thus, sales receipts of black-owned businesses totaled \$32,197,000,000 according to the most recent statistics available (U. S. Department of Commerce, 2000). These numbers mean that there are members of the black minority that comprise an attractive market segment for the products and services offered by the finance industry. Indeed, one study noted that the phrase the "emerging black middle class" is passé; the group has arrived (Lach, 1999).

Nevertheless, the mere existence of a substantial segment does not justify a unique marketing approach. Indeed, the route to reaching African-Americans is not necessarily clear. Some studies have argued that the differences between blacks and whites can be attributed mainly to social class, income, and location of residence (O'Hare, 1987). This view is supported by studies into the value orientation of the middle class that found many similarities between blacks and whites (Schiffman & Kanuk, 1997). Such similarities would be expected to lead to a convergence of values among the races in situations where socioeconomic levels are comparable, and there would be little need for a special marketing mix to appeal to this racial segment.

Other studies, on the contrary, have shown that there are significant differences between the races and that it would be a mistake to think otherwise. Indeed, one such study asserted that African-Americans do not seek to converge into the mainstream culture as incomes rise (Schlossberg, 1993). Instead, the importance and value of ethnic heritage and

identity rises as incomes and educational levels increase (Berry, 1991), and the tastes of African-Americans do not resemble those of whites (Williams & Qualls, 1989). These findings lend support to the statement of one black advertising executive who said, "Black people are not dark skinned white people – there are cultural values that cause us to be vastly different from the majority of the population" (Spadoni, 1984).

If this statement is correct, differences in values and culture that lead to differences in consumption patterns across different racial groups should be evident in the consumption of financial services. Unfortunately, very little academic research examines how financial asset consumption preferences vary across different racial groups, and most prior research examines investment portfolio differences between black and white households as a secondary issue. In general, past studies focus on (1) differences in wealth accumulation rates between black and white households, invoking asset portfolio differences only to explain divergent rates of wealth accumulation, or (2) differences in risk tolerance across the races, using portfolio composition differences to illustrate differences in exposure to liquidity and default risk across different racial groups. While these studies touch on investment portfolio composition differences across different racial groups, these portfolio differences are seldom the focal point of the research effort and they frequently reference a limited spectrum of investment assets in only a few financial categories, and offer little to no information linking findings to marketing strategies.

In spite of these limitations, the wealth accumulation literature does provide a useful starting point to characterize differences in the financial holdings of black and white consumers. For example, it is widely recognized that the rate of wealth accumulation across black households is significantly below that of whites (Kreinin, 1959; Terrell, 1971; Sobol, 1979; Blau & Graham, 1990; Wolff, 1994; Myers & Chung, 1996). Wealth accumulation rates are positively related to household income levels (Kreinin, 1959; Terrell, 1971; Sobol 1979), and positively related to educational achievement (Kreinin, 1959; Terrell, 1971). However, this does not lead to the corollary conclusion that the wealth gap between black and white households narrows with advancing income and educational attainment because the literature is silent about how the wealth gap changes with advancing income and educational attainment levels across different racial groups.

Nevertheless, previous research findings regarding blacks' consumption of financial products is somewhat brief because investment portfolio differences usually do not represent the primary focal point of the research efforts cited, and the studies cited offer conclusions on the basis of very few categorical investment choices. Therefore the remainder of this study seeks to test the veracity of previous research conclusions and build on these conclusions by considering an expanded array of investment alternatives to profile portfolio preference differences across black and white households. Moreover, the study will show whether the financial portfolio implications suggested by previous studies hold true under this wider array of investment alternatives. Further, this study highlights statistically significant pair wise differences between black and white financial portfolios. However, these isolated pair wise differences may fail to capture the full range of portfolio differences between black and white consumers. This is because a large body of prior research has shown that the magnitude of investment balances and the rate of wealth accumulation across African-American households significantly lag that of white households. Consequently, this research effort also examines the changing *relative* magnitude of investment portfolio differences across black and white households, noting whether these differences are increasing, decreasing, or remaining the same, as variables known to influence investment portfolio preferences – such as income and educational attainment level – change. Thus, the research questions examined in this study are:

- Is there a difference in the magnitude of wealth accumulation between black and white households?
- Is there a difference in the proportionate holdings of risky financial assets between black and white households?
- Is there a difference in the proportionate holdings of consumption type financial assets between black and white households?
- Is there a difference in investment portfolio preference between black and white households when controlling for income levels?
- Is there a difference in investment portfolio preference between black and white households when controlling for educational levels?

3. Data and Methodology

This study reports and evaluates data gathered from the 1998 Survey of Consumer Finances (SCF) prepared by the Board of Governors of the Federal Reserve System in cooperation with the Statistics and Income Division of the Internal Revenue Service. The SCF provides detailed information on the financial characteristics of U.S. households, including financial asset and liability holding patterns, real estate ownership, and household net worth. Also included is a variety of demographic and attitudinal characteristics covering age, sex, race, educational attainment, income, and other classificatory variables useful for characterizing household balance sheet characteristics across different subgroups within the American population. A more complete description of the SCF dataset is given by Kennickell, Starr-McCluer, and Surette (2000).

The SCF dataset uses a dual-frame sampling plan that incorporates both an area-probability sample and a special list sample derived from IRS tax records. The area-probability sample provides information on financial variables that are widely distributed in the general U.S. population, such as automobile ownership and home mortgages. The list sample represents an over sample of relatively wealthy families designed to capture financial data items that are highly concentrated within a relatively small proportion of the population, such as commercial real estate holdings and household trust fund ownership. This unique sampling methodology results in the over sampling of households more likely to be wealthy, which requires that descriptive statistical measures derived from the SCF sample be weighted to generate sampling estimates that are projectible to the entire U.S. population. The descriptive statistics reported below are derived from the full, weighted version of the SCF sample which surveyed 4,305 households to produce a total of 21,525 potential observations (Board of Governors of the Federal Reserve System, 2000, p. 27). Moreover, following the recommended course of action described in the 1998 *Codebook for the Survey of Consumer Finances* (Board of Governors of the Federal Reserve System, 2000, pp. 28-32), the statistically significant mean differences and proportion differences reported below have been obtained using a test statistic suitable when target population variances are assumed to be both unequal and unknown.

4. Results and Discussion: Asset Holding Patterns across Black and White Consumers

The portfolio of wealth-accumulation assets, including both financial and real property assets varies markedly between black and white households. Tables 1 and 2 present proportionate holdings of various financial asset categories, as well as household real estate holdings covering respondents' primary residence, other vacation property owned, and other nonvacation property. (To conserve space in the data tables, Tables 1 and 2 are abridged to report only three income and educational categories; the original SCF dataset includes a greater number of categories.) In addition, these tables provide mean dollar values of financial accounts and real property holdings across the full SCF dataset. In all cases, the results report mean financial values rather than the median percentile values, because the public version of the SCF dataset is adjusted for outliers and other plausible errors in data reporting and coding before it is released to the public, and the mean is better able to convey the wide dispersion in the reported data for some response groups (Board of Governors of the Federal Reserve System, 2000, pp. 7-8). In this case, understanding the wide range of item responses across particular groups is important in helping to characterize differences between black and white investment portfolios. In order to control for differences in asset holdings that can be explained by demographic characteristics such as income and education, the reported data stratify household asset holdings by respondent income (Table 1), and highest educational grade-level attained by respondents (Table 2).

5. Magnitude of Wealth Accumulation

The most notable difference between black and white households is that the dollar value of total asset holdings is substantially greater across white respondents. This gap reflects the wide net worth disparity between black and white consumers reported by Scott (1998), Myers and Chung (1996), and a host of other researchers. Moreover, the gap does not appear to be related to the relative popularity of various asset categories, such as common stock versus real estate, across different racial groups. As Scott (1998), Lach (1999), and Badu, Daniels, and Salandro (1999) suggest, African-American households are particularly conservative in their investment style, preferring real estate assets and insurance products to stock and bond investments. Even within these relatively more popular investment categories, however, the mean values for all categories of real property investments across the African-American sample lie well below their corresponding values in white households. This trend persists across all income and education levels; and unlike other asset

holding patterns, the real estate gap grows wider, not narrower, as income and educational attainment increase. In most cases, this is attributable to the increased valuation dispersion observed across real estate holdings of white households. The wide range of real estate values is particularly evident in the non vacation real estate category, where commercial real estate assets are particularly concentrated across a white ownership group.

6. Proportionate Holdings of Risky Financial Assets

Reviewing financial asset holdings across the various income categories shown in Table 1 reveals a striking difference in portfolio composition for relatively high-risk, high-return financial assets between black and white consumers. The absence of corporate debt and equity securities within black families' investment portfolios – and the corresponding concentration of wealth in real property and life insurance assets across these households – creates a stark contrast with white households' portfolio holdings. This absence of financial diversification, coupled with the concentration of wealth in lower-yielding financial assets and real property, signals that African-American households face far greater unsystematic financial risk, lower portfolio returns, and a diminished rate of wealth accumulation over time in their wealth-creating asset portfolios.

While this conclusion is troubling, it is consistent with other research results investigating racial differences in investing preferences. A number of studies – including Boyce (1998), Zhong and Xiao (1995), Lach (1999), and Gutter, Fox, and Montalto (1999) – point out the wide disparity in equity ownership between black and white households. Past research offers a number of different explanations for this disparity. Bajtelsmit and Bernasek (1996) attribute it to the greater relative influence of black women in making household investment decisions and the relatively greater risk aversion observed across these investors. Lach (1999) and Vatter and Palm (1977) attribute it to a lack of understanding of corporate equity and debt instruments across black households, and limited access to information regarding these investment alternatives. Still other researchers attribute it to differences in risk tolerance related to socioeconomic factors (Schooley & Worden, 1996), educational attainment (Shaw, 1996), and a savings motive driven by near-future needs for cash, such as saving for college expenses, rather than distant-future events, like retirement savings (Lach, 1999). Finally, Burlew, Banks, McAdoo, and Azibo (1992) attribute the absence of relatively illiquid financial investments – such as stocks, bonds, and 401-K retirement assets – in African-American households to stronger current consumption preferences across black households, while Pitts, Whalen, O'Keefe, and Murray (1989) and Morrall (1996) suggest that blacks display a higher preference for very liquid investments as well as cash holdings.

7. Proportionate Holdings of Consumption Type Investments

In terms of investments preferred, black households do appear to display a preference for consumptive-type real estate. This finding that supports the work of Terrell (1971), Sobol (1979), Blau and Graham (1990) and Brimmer (1991). Blacks show a far greater relative investment in consumption-oriented real property, such as a personal residence or vacation property, and a smaller corresponding investment in income-producing business property, captured in the other non vacation property classification within the SCF dataset. While white households also report a relative preference for residential and vacation-type properties over business properties, the relative strength of this preference is not as great as it is for black households. However, it is also likely that the absence of business property ownership across black households reflects a lower incidence of family business ownership within black households.

While Lach (1999) suggests that life insurance holdings often parallel real estate holding patterns across black households, this trend is not evident in the 1998 SCF dataset. The mean value of life insurance assets across black households modestly exceeds the value of white households' life insurance assets for every income category in the SCF dataset. While these pairwise mean differences are not statistically significant, the life insurance category represents the only financial asset classification for which the dollar value of black household holdings exceeds that of white households. For all income groups, this supports the assertion by Scott (1998) and Badu, Daniels, and Salandro (1999) that African-Americans prefer relatively conservative financial alternatives in their investment portfolios.

8. Investment Portfolio Preferences by Income

As discussed previously, there is a wide disparity between black and white households' portfolio holdings. This gap persists across all income levels and is particularly true regarding preferences for risky financial assets where blacks have a disproportionately lower amount of their portfolios invested. Nevertheless, the gap is much smaller in the lower risk categories such as bank transaction accounts, particularly for upper middle- and high-income families. This reflects the black families' greater preference for highly liquid (less risky) financial assets. Further, the distance between the percentage of black and white families reporting holdings of checking and savings deposits narrows with increasing income, but the valuation gap between the dollar values of mean account balances across black and white households does not diminish in similar fashion. Like other wealth-oriented asset categories, there is a persistent difference between bank demand, time, and savings deposit balances reported by black and white households. This difference remains unexplained by income or advancing educational attainment.

Consistent with the notion that black families focus on near-term savings goals (Lach, 1999), the use of tax-advantaged retirement savings vehicles such as IRA and KEOGH accounts is much less pronounced across African-American families. Moreover, Tables 1 and 2 illustrate that the retirement savings gap does not diminish with increasing income or increased educational attainment. While blacks close much of the gap between differential residential property values as income, household age, and educational attainment levels rise; black households remain severely under invested in retirement wealth-building categories. A wide disparity between the IRA/KEOGH holdings of black and white households persists among even the most affluent, well-educated black households.

As a final point of interest in Table 1, it is noteworthy that while real estate ownership is far more common among lower- and middle-income white families, the use of debt financing to obtain personal real estate is quite similar across both races. Following the convention (Reichenstein, 1998) that time-series price changes in real property and the corresponding mortgage instrument used to finance the property do not necessarily move in lockstep, making it inappropriate to measure the equity position in real estate by netting current mortgage balances against the fair market value of real property, Table 1 reports gross property values and mortgage balances associated with these investments separately.

Examining proportionate data describing the prevalence of mortgage debt across racial groups in various income categories reveals that the incidence of mortgage debt and the magnitude of this debt are frequently quite similar for black and white families. What is different, however, is the size of mortgage debt relative to the market value of real property encumbered by this debt. Across all income categories, black families are more heavily leveraged than their white counterparts, with reported mortgage balances representing a far larger percentage of the value of real property owned.

9. Investment Portfolio Preferences by Educational Attainment


Many researchers – including Yuh and Hanna (1997), Shaw (1996), and Lach (1999) – suggest that preferences for holding risky assets in general, and equity securities in particular, rise with increasing educational attainment. The data reported in Table 2 support this contention, as stock and bond ownership rates rise with increasing educational attainment across both black and white subgroups of the SCF sample. For both races, equity holdings accelerate dramatically among households in which respondents possess a baccalaureate degree. Even among respondents with advanced educational attainment levels, however, black equity holdings significantly lag their white counterparts in both the proportion of the sample owning stock and the mean market value of equity holdings.

It is noteworthy that increased educational attainment below the college-graduate category contributes to increased family holdings of risky assets, but only in a modest way. Both black and white respondents who report completing some undergraduate college coursework or receiving a high school diploma evidence only slightly more stock and bond holdings than respondents who failed to complete a secondary school education. Earning a college degree is a significant determinant of household investment patterns across both black and white households. The impact on the risk-return characteristics of family asset portfolios, however, remains much more pronounced among white households, which evidence greater diversification across financial asset categories and substantially greater investment in stocks, bonds, and mutual fund assets.

In virtually all cases, the proportion of black households reporting ownership of a particular financial asset lies well below the percentage of white families reporting ownership of the same asset. The exception to this generalization is life insurance holdings across black households. Within white households, the percentage of respondents reporting some life insurance ownership begins at 62 percent in families that fail to complete a high school education and rises progressively with increasing educational attainment until reaching 83 percent among respondents who report attending or completing graduate school. Black households report remarkably similar rates of life insurance ownership, beginning at 60 percent for black respondents who fail to complete high school, rising to 81 percent across those who have attended or completed graduate school. The data suggest that black households prefer the relative stability and security of life insurance products over riskier and more price volatile investments in stocks, corporate bonds, and other brokerage assets. This preference transcends increasing income and educational attainment levels within the SCF sample.

Finally, educational attainment levels represent a much more important determinant of household banking relationships among black consumers than white consumers. The proportion of black households reporting use of these traditional commercial banking products rises dramatically with increasing education, from less than 30 percent for respondents who fail to complete high school to over 96 percent for respondents who have attended or completed graduate school. Across white respondents, more than 72 percent of non-high school graduates report demand deposit account ownership, and this number rises to 99 percent across respondents who have attended or completed graduate school. At higher levels of educational attainment, black households' commercial banking relationships closely resemble their white counterparts. At lower levels of educational attainment, particularly in the case of individuals who fail to complete a secondary school education, black consumers' banking relationships are far different than those observed within white households, indicating that a disproportionate number of unbanked consumers are concentrated within the African-American community.

10. Summary and Recommendations

This paper has shown that the African-American market for financial services has grown rapidly in size and viability. This growth represents a major opportunity for the marketers of financial services, because statistical evidence indicates that the financial asset profiles of black households trail those of their white counterparts in terms of breadth and depth of holdings, particularly in the area of relatively risky, high yield financial assets. Moreover, the paper has shown that the African-American segment of the market demonstrates some unique attitudes and behaviors that impact purchase decision patterns. To respond to the opportunity to serve the needs of this emerging segment of the market, this paper shows that it is important for financial service providers to be aware that investment preferences and asset accumulation patterns differ across different racial groups, and will require a creative blend of insights and marketing tactics. Examined in this perspective, this paper provides marketers of financial services with information to understand the African-American community, tailor investment information to the unique needs of this community, and develop the marketing approaches needed to render effective service to the families and individuals who comprise this attractive and growing segment. 

References

1. Bajtelsmit, V. & Bernasek, A. (1996). Why Do Women Invest Differently than Men? *Financial Counseling and Planning* 7, 1-9.
2. Badu, Y.A., Daniels, K.N., & Salandro, D. P. (1999). An Empirical Analysis of Differences in Black and White Asset and Liability Combinations. *Financial Services Review* 8 (3), 129-147.
3. Berry, J. (1991). Six Myths About Black Consumers. *Adweek's Marketing Week* (May 6), 6-19.
4. Blau, F. D. & Graham, J. W. (1990). Black-White Differences in Wealth and Asset Composition. *Quarterly Journal of Economics* 105 (2), 321-339.
5. Board of Governors of the Federal Reserve System. (2000). *Codebook for 1998 Survey of Consumer Finances*. Washington, D.C.: Federal Reserve System (February 15).
6. Boyce, J. (1998). Blacks are Bearish on Wall Street Says New Survey. *The Wall Street Journal* (April 9), C-21.
7. Brimmer, A. (1991). Building Wealth and Assets. *Black Enterprise* (July), 32.

8. Burlew, A., Banks, W., McAdoo, H., & Azibo, D. (eds.). (1992). *African-American Psychology*, Newbury Park, NJ: Sage Publications, Inc.
9. Gutter, M. S., Fox, J. J., & Montalto, C. P. (1999). Racial Differences in Investor Decision Making. *Financial Services Review* 8 (3), 149-162.
10. Kennickell, A. B., Starr-McCluer, M., & Surette, B. J. (2000). Recent Changes in U.S. Family Finances: Results from the 1998 Survey of Consumer Finances. *Federal Reserve Bulletin* 86 (January), 1-29.
11. Kreinin, M. E. (1959). Factors Associated with Stock Ownership. *Review of Economics and Statistics* 41 (1), 12-23.
12. Lach, J. (1999). The Color of Money. *American Demographics* (February), 59-60.
13. Montalto, C. P. & Sung, J. Multiple Imputation in the 1992 Survey of Consumer Finances. *Financial Counseling and Planning* 7 (1996), 133-146.
14. Morrall, K. (1996). Appealing to the African-American Market. *Bank Marketing* 28 (5), 18-23.
15. Morris, E. (1993). The Difference in Black and White. *American Demographics* 15 (January), 44-49.
16. Myers, S. & Chung, C. (1996). Racial Differences in Home Ownership and Home Equity among Pre retirement-Aged Households. *The Gerontologist* 36 (3), 350-360.
17. O'Hare, W. (1987). Blacks and Whites: One Market or Two? *American Demographics* 9 (March), 44-48.
18. Pitts, R. E., Whalen, D. J., O'Keefe, R., & Murray, V. (1989). Black and White Response to Culturally Targeted Television Commercials: A Values-Based Approach. *Psychology and Marketing* 6 (4), 314-323.
19. Reichenstein, W. (1998). Calculating a Family's Asset Mix. *Financial Services Review* 7 (3), 195-206.
20. Schiffman, L. G. & Kanuk, L. L. (1997). *Consumer Behavior*. Upper Saddle River, N. J.: Prentice-Hall, Inc.
21. Schlossberg, H. (1993). Many Marketers Still Consider Blacks 'Dark Skinned Whites'. *Marketing News* 1 (January 18), 13.
22. Schooley, D. I. & Worden, D. D. (1996). Risk Aversion Measures: Comparing Attitudes and Asset Allocation. *Financial Services Review* 5 (2), 87-99.
23. Scott, M. (1998). Don't Let the Bull Market Pass You By. *Black Enterprise* 28 (June), 243.
24. Shaw, K. (1996). An Empirical Analysis of Risk Aversion and Income Growth. *Journal of Labor Economics* 14 (4), 626-653.
25. Sobol, M. G. (1979). Factors Influencing Private Capital Accumulation on the 'Eve of Retirement.' *Review of Economics and Statistics* 61 (November), 585-593.
26. Spadoni, M. (1984). Marketing to Blacks-How to Media Segment the Target Audience. *Advertising Age* (November 19), 43.
27. Terrell, H. S. (1971). Wealth Accumulation of Black and White Families: The Empirical Evidence. *Journal of Finance* 26 (May), 363-377.
28. Yuh, Y. & Hanna, S. (1997). The Demand for Risky Assets in Retirement Portfolios. *Presented at the annual meeting of the Academy of Financial Services*.
29. U.S. Department of Commerce, Bureau of the Census. (2000). *Statistical Abstract of the United States*. Washington, D.C.: U.S. Government Printing Office.
30. Vatter, H. & Palm, T., eds. (1977). *Economics of Black America*. New York: Harcourt Brace Jovanovich, Inc.
31. Williams, J. D. & Qualls, W. J. (1989). Middle-Class Black Consumers and Intensity of Ethnic Identification. *Psychology and Marketing* 6 (winter), 263-86.
32. Wolff, E. N. (1994). Trends in Household Wealth in the United States: 1962-1983 and 1983-1989. *Working paper, 94-03*. New York University Department of Economics (February).
33. Zhong L. & Xiao, J. (1995). Determinants of Family Bond and Stock Holdings. *Financial Counseling and Planning* 6, 107-114.